A Citizen's Guide to the Natural Resource District

Harford County protects many of its sensitive environmental features through the Natural Resources District (NRD) subsection of the Zoning Code. Harford County was one of the forerunners in establishing local protection of sensitive environmental areas such as streams and their buffers, non-tidal wetlands, and steep slopes. The NRD was established in 1982 and amended in 1985. In general, NRD helps protect the ecology of an area by minimizing soil disturbance and loss of natural ground cover.





The NRD regulations protect non-tidal wetlands. To be considered a wetland, the area must generally meet the following characteristics:

- hydrophitic vegetation (plants suited to wet areas)
- hydrologically connected (be connected to other water bodies)
- soils present are hydric in nature (soils are typically wet)

Also, the wetland area must be at least 40,000 square feet in size. When these characteristics for determining wetlands are generally met, the NRD provides a 75 foot buffer from the edge of the wetlands. The state and federal government have their own regulations regarding wetlands. Please contact the <u>Maryland Department of the Environment</u> (MDE) or the <u>Army Corps of Engineers</u> (ACOE) for additional information. Associated environmental benefits of wetlands include providing habitat for a variety of animals, flood management, and filtering of stormwater pollutants into groundwater and streams. Wetlands are "living filters", and the undisturbed buffer around them gives them the opportunity to thrive.

Steep Slopes

Steep Slopes are defined as those areas that have a slope greater than or equal to 25%. The area must be greater than 40,000 square feet in size in order to qualify for protection. Steep slopes are protected from development and are considered a non-disturbance area. Erosion and slope failure are probably the most common and easily recognized of the nonpoint source pollutants. This is a major concern for our region's shared resource, the Chesapeake Bay. Sediment suspended in the water can reduce or block sunlight which is needed by beneficial aquatic plants. Sediment also carries nutrients such as phosphates and nitrates. When in excess, nutrients trigger algae blooms. Algae blooms block sunlight to important underwater plants that provide food and habitat for a variety of aquatic species. When algae die, they sink to the bottom and decompose in a process that depletes the water of its oxygen. This depletion of oxygen results in areas where other animals cannot survive. This is part of the reason why shellfish harvests have declined in the past decade. By protecting these slopes from disturbance, we can effectively help protect our waterways and encourage the revitalization of shellfish stocks.

Streams

Vegetation, especially forested areas around our streams, provides a host of benefits. Vegetated areas along streams help absorb nutrients, sediment, and other pollutants associated with agricultural, urban, and suburban runoff. These areas also provide habitat that a variety of animals need to live and breed successfully. Vegetated areas provide shading of streams to help optimize light, temperature, and oxygen conditions necessary to maintain high biological diversity and productivity within the stream. Certain streams within the County receive a buffer of 150 feet on both sides of their banks. Other streams receive a 75 foot protection area on both sides of the bank. Various factors influence the buffer size and may include the size of the drainage area and the original stream designation. For more information on specific stream buffers, please contact the Department of Planning and Zoning.

What can I do in NRD areas?

The NRD is a non-disturbance area. Generally, mass cutting, clearing, grading or removal of vegetation is not allowed. Accessory structures, including sheds, play equipment, decks and pools, are <u>not</u> permitted within these areas. Only invasive species of underbrush may be removed. These species include multi-flora rose, and poison ivy. The NRD area must be left in its natural state in order to regenerate new growth. You may plant native species of shrubs and trees. This vegetation acts as a buffer to the natural resource by absorbing pollutants and providing wildlife habitat. The NRD is not to be cleared for enlargement of your usable back yard or to plant grass. The only trees allowed to be removed without a permit are those which are dead or diseased and/or in danger of falling on your home. Please, before you cut any trees, notify the Department of Planning and Zoning of your intentions.

How can I tell if an area is NRD?

Determining wetlands may be difficult. It is recommended that a wetland delineation be conducted by a certified professional. However, the first step may be to look for a change in vegetation or pockets of water on your property. If any of these characteristics exist, you may have wetlands on your property. Steep slopes, streams and/or wetlands may indicate NRD on your property. Lots recorded after 1985 will show NRD on the final record plat. For more information contact the Department of Planning and Zoning.